

1 ABSTRACT OF THE DISCLOSURE

2 Methods used in semiconductor electroplating systems, such as for
3 plating copper, onto a semiconductor wafer or other semiconductor
4 workpiece. The methods apply to patterned metal layers plated onto
5 a seed layer which is partially protected by an overlying photoresist or
6 other coating. The methods employ an electrode assembly which has
7 a boot which seals about a contact face of the electrode. The sealing
8 is performed by engaging the seal against photoresist to prevent
9 corrosion of the seal layer. The area enclosed by the sealing includes
10 a via which is surrounded by the seal. The electrode contact extends
11 through the via to provide electrical contact with the metallic seed
12 layer. Plating of copper or other metal proceeds at exposed seed layer
13 areas.

14
15
16
17
18
19
20
21
22
23
24